

## The geographic range of *Rhyacionia hafneri* (Rebel, 1937) (Tortricidae)

JOSEF JAROŠ<sup>1</sup> & JAN LIŠKA<sup>2</sup>

<sup>1</sup> Institute of Entomology, Czech Academy of Sciences, Branišovská 31, CZ-370 05 České Budějovice, Czechia; e-mail: jaros@entu.cas.cz

<sup>2</sup> Forestry and Game Management Research Institute, Strnady 136, CZ-156 04 Praha 5 – Zbraslav, Czechia; e-mail: liska@vulhm.cz

Recently, Huemer (2003) redescribed the tortricid moth *Rhyacionia hafneri* (Rebel, 1937) and recorded this species from Slovenia for the first time. Huemer (2003) also illustrated diagnostic characters and discussed the distribution of *R. hafneri* and closely related taxa. It seems that *R. hafneri* is a locally distributed, probably rare submediterranean species. With the exception of the type locality 'Dalmatia – Knin' (coastal Croatia) and records from three localities in Slovenia (Huemer 2003), no other distributional data are available and the life history remains unknown. Referring to Huemer's (2003) diagnosis and additional data provided by Razowski (2004), several additional specimens of *R. hafneri* have now been discovered:

**Material.** 3♂, 2♀ **Slovenia**, Nanos Mts, Strmec (45°50'N, 14°00'E), 800 m a.s.l., 28.v.2000, Liška leg., Liška & Jaroš coll.; 1♀ **Bulgaria**, foothills of the Rhodope Mts., Asenovgrad (42°00'N, 24°55'E), 300 m a.s.l., 29.v.1984, Jaroš leg. et coll.; 2♀ **Hungary**, Vertés Hills, Csákberény (47°20'N, 18°15'E), 350 m a.s.l., 8.v.2003, Liška leg. et coll.; 1♀ **Czechia**, South Moravia, Ketkovice (49°10'N, 16°15'E), 360 m a.s.l., 28.v.1999, Šumpich leg. et coll.; 1♂ Bílé Karpaty Mts, Čertoryje National Reserve, (48°50'N, 17°25'E), 350 m a.s.l., 5.–7.vi.1997, Šumpich leg. et coll.; 1♀ Moravský kras (Moravian Karst), Olomučany (49°20'N, 16°40'E), 500 m a.s.l., 23.v.2002, Z. Laštůvka leg., Jaroš coll.

All the localities are characteristic limestone habitats. The dominant native pine species of the Slovenia and Bulgaria localities is *Pinus nigra*, which is undoubtedly the food plant of *R. hafneri* there. In the Vertés Hills (Hungary) and the three localities of South Moravia (Czechia) the only native pine species is *P. sylvestris* (but *P. nigra* was introduced into these areas more than 100 years ago and now is quite common). Therefore, it is possible that *R. hafneri* spread to Central Europe when *P. nigra* was planted there by foresters. On the other hand, most localities of *P. nigra* and associated *R. hafneri* in Slovenia, Bulgaria and Croatia are certainly autochthonous (cf. Meusel et al. 1965), but recently *P. nigra* has been extensively planted in all these countries. It is expected that *R. hafneri* will be found also in northern Italy, Austria, Romania and southern Slovakia, where *P. nigra* is also planted by foresters in some regions. Food plant studies and monitoring of the distribution and spread of *R. hafneri* in Europe are badly needed.

### Acknowledgements

We are grateful to Zdeněk Laštůvka and Jan Šumpich for providing us with the material of *R. hafneri* from Czechia. The study was partially supported by a Grant of the Czech Academy of Sciences 1QS500070505.

### References

- Huemer, P. 2003. *Rhyacionia hafneri* (Rebel, 1937) sp. rev., eine verkannte Wicklerart aus dem Mittelmeergebiet (Lepidoptera: Tortricidae). – Entomologische Zeitschrift (Stuttgart) **113**: 98–101.
- Meusel, H., E. Jäger & E. Weinert 1965. Vergleichende Chorologie der Zentraleuropäischen Flora. Karten. – Gustav Fischer Verlag, Jena, 258 pp.
- Razowski, J. 2004. Tortricidae (Lepidoptera) of Europe, Vol. 2: Olethreutinae. – F. Slamka, Bratislava, 301 pp.